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<b>(21) International Application Number:</b> PCT/US95/02576 <b>(22) International Filing Date:</b> 2 March 1995 (02.03.95) <b>(30) Priority Data:</b> 08/205,697 2 March 1994 (02.03.94) US <b>(60) Parent Application or Grant</b> (63) Related by Continuation US 08/205,697 (CIP) Filed on 2 March 1994 (02.03.94) <b>(71) Applicants (for all designated States except US):</b> BRIGHAM AND WOMEN'S HOSPITAL [US/US]; 75 Francis Street, Boston, MA 02115 (US). DANA-FARBER CANCER INSTITUTE [US/US]; 44 Binney Street, Boston, MA 02115 (US). <b>(72) Inventors; and</b> <b>(75) Inventors/Applicants (for US only):</b> SHARPE, Arlene, H. [US/US]; 305 Walnut Street, Brookline, MA 02146 (US). BORRIELLO, Francescopaolo [US/US]; Apartment #3, 20 Perry Street, Brookline, MA 02146 (US). FREEMAN, Gordon, J. [US/US]; 305 Walnut Street, Brookline, MA		02146 (US). NADLER, Lee, M. [US/US]; 36 Cross Hill Road, Newton, MA 02159 (US). <b>(74) Agents:</b> MANDRAGOURAS, Amy, E. et al.; Lahive & Cockfield, 60 State Street, Boston, MA 02109 (US). <b>(81) Designated States:</b> AU, CA, JP, US, European patent (AT, BE, CH, DE, DK, ES, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE). <b>Published</b> <i>Without international search report and to be republished upon receipt of that report.</i>
<b>(54) Title:</b> NOVEL FORMS OF T CELLS COSTIMULATORY MOLECULES AND USES THEREFOR <b>(57) Abstract</b> <p>Novel structural forms of T cell costimulatory molecules are described. These structural forms comprise a novel structural domain or have a structural domain deleted or added. The structural forms correspond to naturally-occurring alternatively spliced forms of T cell costimulatory molecules or variants thereof which can be produced by standard recombinant DNA techniques. In one embodiment, the T cell costimulatory molecule of the invention contains a novel cytoplasmic domain. In another embodiment, the T cell costimulatory molecule of the invention contains a novel signal peptide domain or has an immunoglobulin variable region-like domain deleted. The novel structural forms of T cell costimulatory molecules can be used to identify agents which stimulate the expression of alternative forms of costimulatory molecules and to identify components of the signal transduction pathway which results in costimulation of T cells.</p>		